UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/603,099	06/19/2003	Bohdan Konstantyn Zabawskyj	P1770US00	8416

85845 7590 10/09/2009

Perry & Currier Inc.
1300 Yonge Street
Suite 500
Toronto, ON M4TIX3
CANADA

EXAMINER	
THIER, MICHAEL	

ART UNIT	PAPER NUMBER
2617	

MAIL DATE	DELIVERY MODE
10/09/2009	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/603,099	ZABAWSKYJ ET AL.	
	Examiner	Art Unit	
	MICHAEL T. THIER	2617	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE *3* MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *30 July 2009*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1,25-30,32-42 and 44-47* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1,25-30,32-42 and 44-47* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date *7/30/2009*.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Response to Arguments

1. Applicant's arguments filed 5/15/2009 and 7/30/2009 have been fully considered but they are not persuasive. However, regarding the arguments to the 112 rejection which have been found to be persuasive, the examiner has withdrawn the rejection in view of the applicant's explanation provided in the remarks filed 5/15/2009.

Applicant argues that Kalavade teaches away from the proposed combination and the combination would in fact increase signaling. Further arguing that Kalvade is teaching that it may be carried out by the operator system and should not be carried out by the CBG.

In response to applicant's argument, the examiner respectfully disagrees. Kalavade teaches in par. 232 that the CBG "preferably" does not generate any billing information and will collect usage information to then send to the operators existing billing system. Harnesk teaches the idea that the control system (similar to the CBG) contains the rating engine (figure 2, item 202). The examiner is not trying to physically combine the references, merely combine the teachings, and as explained in Harnesk par. 14, his invention allows for a reduction in signaling. Utilizing the idea to incorporate the rating engine in the CBG of Kalavade (such as the rating engine in the control system of Harnesk), would clearly reduce signaling between the CBG and the operators existing billing system. The mere fact that Kalavade teaches that. "the CBG preferable does not generate any billing information...", does not mean that it cannot generate billing information. The term "preferably" does not limit the CBG to never generating

billing information, and therefore does not explicitly teach away from the combination, and thus the combination would have been obvious to one of ordinary skill in the art at the time of invention in order to cause a reduction in signaling between specific systems (i.e. whether an increase in signaling between another system occurs, this is irrelevant since the motivation was to reduce signaling between a set of systems.)

Applicant argues, "As also set out at paragraph [232] of Kalavade, the operator system generates a final bill for the user. Therefore, the CBG must send information to the operator system, whether or not it has been rated. Whether the CBG sends unrated usage information…or rated usage information…to the operator system matters little, because the operator system must still receive sufficient information to generate a bill."

In response to applicant's argument, the examiner respectfully disagrees. First, the examiner is unsure how this argument relates to the claims. In any event, the combination of Kalavade and Harnesk would allow for the CBG (of Kalavade) to generate billing information (as in the control system of Harnesk). Therefore, the information does not need to be transmitted to the operator system. Again, par. 232 of Kalavade states "…preferably does not generate any billing information", which leads one to believe that it is not impossible for it to do so. And if it does generate the billing information that it is not necessary to send the usage information to the operator system to generate the bill, since it is already generated.

Applicant further argues, that Kalavade's router must obtain a rate from the modified CBG proposed by the examiner, and then send the instruction. Clearly

this actually increases traffic between Kalavade's unmodified router and CBG. (again seems to be arguing against the motivation to combine the references and not whether the applied art teaches a specific limitation or not).

In response to applicant's argument that there is no suggestion to combine the references, the examiner recognizes that obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See *In re Fine*, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988) and *In re Jones*, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). In this case, a reduction in signaling between two systems can be understood. Whether an increase in signaling takes place with another system seems irrelevant since one may be motivated to reduce signaling between two specific systems and not really care if it increases signaling at another system (i.e. perhaps looking to reduce signaling at a specific component that can only handle a specific load, while another system can handle more, thus an increase at the other system may not matter). The examiner is not trying to physically combine the provided references, merely combine the teachings provided in them. The claimed limitations are clearly provided in the prior art as pointed out by the examiner, and each and every limitations is clearly shown and explained. The motivation to combine Harnesk, i.e. to reduce signaling between two systems, with Kalavade could have clearly sparked one of ordinary skill in the art at the time of

invention to combine the teachings of the references.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

3. Claims 1, 25-29, 32, 35-41, 44 and 47 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kalavade et al. (US 2003/0051041) in view of Takeuchi (US 2003/0134615) in further view of Harnesk et al. (US 2006/0008063).

Regarding claims 1 and 36. Kalavade teaches Wireless Local Area Network (WLAN) gateway system (abstract, par. 10-12).

an access gateway connected to a server; (figure 9 item 52)

a session controller connected to said access gateway; (figure 9 item 10)

a charging element connected to said session controller; (figure 9 billing modules, further see par 229, i.e. the CBG generates charging information.), said charging element maintaining charging details associated with a mobile handset (par. 249 and 251, accounting module collects information and the user data base module in the CBG contains user specific information.)

a rating element connected to said session controller; (figure 9 billing modules, which may read on rating element, however the examiner has provided the Harnesk reference below to clearly describe the claimed rating element.), said rating element

maintaining a rating profile information associated with said mobile handset. (par. 222 and 226, i.e. par. 222 states the accounting messages include information such as number of bytes and duration of session and par. 226 explains the accounting database stores accounting information, this reads on storing rating information.)

an interface connected to said access gateway for connecting a mobile handset to said access gateway via said interface; (figure 9, see the line connected between items 50 and 52, i.e. there must be some type of interface to allow them to connect, further see par. 216)

a computing device connected to said access gateway via a WLAN access network; (figure 9 item 50, connected through the wireless hotspot.)

said system being configured to perform a method for providing access to said server from said computing device, comprising the steps of:

receiving at said access gateway authentication information for a subscriber associated with said computing device; (par. 185-187)

sending a first message from said access gateway to said mobile handset; (par. 189, i.e. the secret token sent to the users phone.) and,

if a reply to said first message is received from said subscriber then permitting said computing device access said server; (par. 190-191) and

if no reply to said first message is received, then denying said computing device to access said server. (see par. 190-191, the CBG validates the user in the user returns the secret, therefore it will not be validated if the secret is not returned and thus access will be denied.)

Kalavade further teaches the idea of *sending an instruction from the access gateway* to the charging element representing charging details associated with access of the server by the computing device in figure 32. (see the usage information accounting request message sent to the CBG from the router, further see par. 414-416.)

However, he does not specifically disclose that the system having a configurable interval, which the system will wait for the reply message to be received within.

Takeuchi teaches an authentication system for use with mobile phones (title and abstract). He teaches the idea that the device must return a response in a given time period or the authentication will fail and access will be denied (see par. 97 and figure 6 items s210 and s215) As seen in figure 6, and in par. 97, he teaches that if a reply (i.e. the authentication information) is received in the given time period the service is provided to the user, and if no authentication information is received within the configurable interval (i.e. predetermined or given time period), then the service is denied.

Therefore it would have been obvious for one of ordinary skill in the art at the time of invention to utilize the teachings of Takeuchi with the teachings as in Kalavade. The motivation for doing so would have been to ease the steps of authentication and restrain unauthorized access to the services. (Takeuchi, end of abstract)

Although Kalavade does specifically disclose the idea of sending instructions from the access gateway to the rating element and the charging element (i.e. the CBG) as seen in par. 414-416, for further clarification, the examiner would like to provide the

Harnesk reference below to show the limitations regarding the rating element, and the sending instructions to the rating element to determine a rate for packets...

Harnesk teaches a method and system for providing flexible charging in a communications network (title and abstract). He discloses the use of a control system (similar to that of the GBG explained in Kalavade) in figure 2 as item 201. In par. 39 he explains the charging system in figure 2 can be used for real-time charging purposes. This control system clearly comprises a rating engine (item 202). Harnesk teaches the idea of the access gateway sending an instruction to the rating element (par. 79-80, the rating engine accepts a request for a user rating table and receives the service class definition for each service class, and volume etc., also seen in the provisional page 3, which explains the packet forwarding system (i.e. the access gateway), initiates a control sequence to the control system, which contains the rating element), to determine a rate for packets carried between said computing device and said access network to establish a rate of charge of said packets according to a different classification assigned to each of said packets. (par. 85 the rating engine then calculates the relevant rating values). Further see par. 9, 45, and 75, where it is clearly explained that the packets can be charged differently depending on what service flow they belong to (i.e. rating each packet based on a classification.) As explained above, Kalavade teaches the idea of sending an instruction from the access gateway to the charging element representing charging details associated with access of the server by the computing device, however he did not explain the charging details where based on the rate. Again, Harnesk clearly teaches sending instructions to a charging element (which can be understood in figure 2

as either item 202, charging policy decision point, or 207 charging policy enforcement point), and par. 88 which explains sending a user rating table in the form of a charging policy to the charging enforcement point.

Therefore it would have been obvious for one of ordinary skill in the art at the time of invention to utilize the teachings of Harnesk with the teachings as in the combination of Takeuchi and Kalavade. The motivation for doing so would have been to allow for providing a flexible real-time charging system, whereby signaling between systems is reduced (Harnesk par. 14)

Regarding claims 25 and 37. Kalavade teaches the access gateway comprises an authentication, authorization and accounting gateway. (figure 9 item 54)

Regarding claims 26 and 38. Kalavade teaches the gateway comprises a AAA server in figure 9 item 54.

Regarding claims 27-28 and 39-40. Kalavade further teaches the interface is a SMPP interface and the first message is a short message in par. 193. (i.e. The password is sent to the users phone using an SMS message, thus there must be an SMS interface.) He further teaches the short message sends information concerning the identity of said subscriber for the purpose of non repudiation in par. 193, (i.e. using a password for authentication reads on this limitation, also explains in par. 196 using the IMSI of the phone to validate the user.) Harnesk further teaches the idea of sending and receiving instructions for modifying subscriber preferences respective to a rate of charge (par. 25, i.e. operator specifies rules, or par. 85 where it is explained that the

rating values can be information about the users roaming status or geographical location.)

Regarding claims 29 and 41. Kalavade further teaches the interface is a USSD gateway in par. 193, 197, and 203.

Regarding claims 32 and 44. Kalavade further teaches charging details include incrementing a charge associated with Charging Detail Records (CDR). (par. 61)

Regarding claims 35 and 47. Kalavade further teaches using an HLR to access the USSD gateway in figure 21, see item 12.

4. Claims 30 and 42 are rejected under 35 U.S.C. 103(a) as being unpatentable over the grounds of rejection as applied to claims 1 and 36 above, and further in view of Schlieben et al. (US 2003/0096605).

Regarding claims 30 and 42. Kalavade, Takeuchi, and Harnesk teach the limitations of the previous claims.

However, they fail to distinctly disclose the limitations where one or more additional messages from the handset is received that includes instructions to modify the subscriber preferences associated with said access of the server via the gateway.

Schlieben teaches the idea of a user of a wireless device being able to edit or change preferences such as a “User Defined Blacklist” in par. 405. The idea of the user adjusting a blacklist reads on changing subscriber preferences associated with access to the server since it is well known in the art that a blacklist would be a list of users who are unable to access the network.

Therefore it would have been obvious for one of ordinary skill in the art at the time of invention to utilize the teachings of Schlieben with the teachings as in the combination of Kalavade, Takeuchi, and Harnesk. The motivation for doing so would have been to allow the user to create lists of users who can and cannot access the network.

5. Claims 33-34 and 45-46 are rejected under 35 U.S.C. 103(a) as being unpatentable over the grounds of rejection as applied to claims 1 and 36 above and in further view of Brown et al. (US 2003/0112936).

Regarding claims 33-34 and 45-46. Kalavade, Takeuchi, and Harnesk teach the limitations of the previous claims.

However, they do not specifically disclose the idea that the access to the WLAN can be paid for using vouchers, credit card, or a prepaid account. The examiner would like to note that these are well known and obvious features in the communication billing art, and would have been obvious to one of ordinary skill in the art at the time of invention. However, to clearly show these limitations the secondary reference Brown is provided below.

Brown teaches a billing system, method, and program (abstract) which allows for all three of these types of payments. See par. 47 where he explains using vouchers to pay for minutes, and par. 126 for using a prepaid account, and finally par. 136 for using a credit card.

Therefore it would have been obvious for one of ordinary skill in the art at the time of invention to utilize the payment methods as in Brown with the system and method of authentication and billing in Kalavade, Takeuchi, and Harnesk. The motivation for doing so would have been to allow for a variety of payment methods, fitting all subscribers needs.

Conclusion

6. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to MICHAEL T. THIER whose telephone number is

(571)272-2832. The examiner can normally be reached on Monday thru Friday 7:30-4:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Patrick Edouard can be reached on (571) 272-7603. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Patrick N. Edouard/
Supervisory Patent Examiner, Art Unit 2617

/MICHAEL T THIER/
Examiner, Art Unit 2617
9/30/09